AMENDMENT TO H.R. 5358 OFFERED BY MS. EDDIE BERNICE JOHNSON OF TEXAS

Page 31, line 3, redesignate section 14 as section 15.

Page 31, after line 2, insert the following new section:

1 SEC. 14. PARTNERSHIPS FOR ACCESS TO LABORATORY

2 SCIENCE.

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3 (a) Program Authorized.—

4 (1) In general.—

(A) Authority to make grants.—The Director of the National Science Foundation (in this section referred to as the "Director") shall carry out a program to award grants to up to 5 high-need local educational agencies to establish partnerships for access to laboratory science to improve laboratories and provide instrumentation as part of a comprehensive program to enhance the quality of mathematics, science, engineering, and technology instruction at the secondary school level.



1	(B) Criteria for awarding grants.—
2	Grants shall be awarded under this section on
3	a competitive, merit-reviewed basis.
4	(2) Partnerships.—In order to be eligible to
5	receive a grant under this section, a high-need local
6	educational agency shall enter into a partnership
7	that—
8	(A) includes an institution of higher edu-
9	cation or a community college; and
10	(B) includes at least one—
11	(i) business or eligible nonprofit orga-
12	nization; or
13	(ii) State educational agency, other
14	public agency, National Laboratory, or
15	community-based organization.
16	(3) Federal share.—The Federal share of
17	the cost of activities carried out using amounts from
18	a grant under this section shall not exceed 33 per-
19	cent.
20	(4) Duration.—A high-need local educational
21	agency that receives approval of a grant application
22	submitted under this section shall be eligible to re-
23	ceive grants under this section for activities de-
24	scribed in the application for a period of 3 fiscal



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years.

1	(5) Plan required.—In order to be eligible
2	for a grant under this section, a high-need local edu-
3	cational agency shall submit to the Director a plan,
4	developed in consultation with teachers, science ad-
5	ministrators, scientists, education researchers, and
6	other individuals with expertise in laboratory science
7	and classroom instruction, for carrying out the pro-
8	gram under this section. Such plan shall—
9	(A) describe how the proposed laboratory
10	improvements and instrumentation are con-
11	sistent with State mathematics and science aca-
12	demic achievement standards;
13	(B) describe how the proposed laboratory
14	improvement and instrumentation are part of a
15	comprehensive program to enhance the quality
16	of mathematics, science, engineering, and tech-
17	nology instruction, including a description of
18	how the laboratory experiences—
19	(i) are designed to produce clear
20	learning outcomes;
21	(ii) are sequenced to complement the
22	classroom science instruction;
23	(iii) are designed to integrate science
24	learning with science content, and



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1	(iv) will incorporate ongoing student
2	reflection and discussion;
3	(C) describe professional development and
4	training activities for teachers and school per-
5	sonnel who will be working in the laboratory fa-
6	cilities;
7	(D) provide assurances that all safety re-
8	quirements as required by State or local ordi-
9	nance or by the Director will be met;
10	(E) describe how the laboratory and in-
11	strumentation will be maintained after the pe-
12	riod of financial assistance provided under the
13	grant; and
14	(F) describe how assessment methods will
15	be used to expand the available research lit-
16	erature regarding the effect of laboratory
17	science on student understanding of scientific
18	concepts and student achievement.
19	(6) Uses of funds.—Grants awarded under
20	this section—
21	(A) shall be used to supplement and not
22	supplant existing programs or activities; and
23	(B) shall be used for activities that draw
24	upon the expertise of all partners to improve

secondary science education by improving lab-



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1	oratories and providing instrumentation as part
2	of a comprehensive program to enhance the
3	quality of mathematics, science, engineering,
4	and technology instruction at the secondary
5	school level in a manner that is consistent with
6	State mathematics and science student aca-
7	demic achievement standards, including—
8	(i) development of a plan for labora-
9	tory improvement and instrumentation
10	that is consistent with State mathematics
11	and science academic achievement stand-
12	ards;
13	(ii) purchase, rental, or leasing of
14	equipment, instrumentation, and other sci-
15	entific educational materials;
16	(iii) maintenance, renovation, and im-
17	provement of laboratory facilities;
18	(iv) professional development and
19	training for teachers;
20	(v) development of curricula and in-
21	structional programs designed to integrate
22	the laboratory experience with classroom
23	instruction;
24	(vi) training in laboratory safety for a
25	school personnel;



1	(vii) design and implementation of
2	hands-on laboratory experiences to encour-
3	age the interest of individuals identified in
4	section 33 or 34 of the Science and Engi-
5	neering Equal Opportunities Act (42
6	U.S.C. 1885a or 1885b) in mathematics,
7	science, engineering, and technology and
8	help prepare such individuals to pursue
9	postsecondary studies in these fields;
10	(viii) development of tools to evaluate
11	activities funded under this subsection; and
12	(ix) any other activities the Director
13	determines will accomplish the goals of this
14	subsection.
15	(7) Limitation on use of funds.—Grants
16	awarded under this section shall not be used for con-
17	struction of new facilities.
18	(b) Selection Process.—
19	(1) Application.—A high-need local edu-
20	cational agency seeking a grant under this section
21	shall submit an application to the Director at such
22	time, in such manner, and containing such informa-
23	tion as the Director may require. The application



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shall include, at a minimum—

1	(A) a description of the partnership en-
2	tered into under subsection (a)(2) and the role
3	that each member will play in implementing the
4	proposal;
5	(B) the plan described in subsection (a)(5);
6	(C) a description of each of the activities
7	to be carried out using amounts from the grant,
8	together with—
9	(i) a description of how such activities
10	will be aligned with State mathematics and
11	science student academic achievement
12	standards and with other activities that
13	promote student achievement in mathe-
14	matics and science;
15	(ii) a description of how such activi-
16	ties will be based on a review of relevant
17	research, including best practices;
18	(iii) a description of why such activi-
19	ties are expected to improve student per-
20	formance and strengthen the quality of
21	mathematics and science instruction;
22	(iv) a description of any activities that
23	will encourage the interest of individuals
24	identified in section 33 or 34 of the

Science and Engineering Equal Opportuni-



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1	ties Act (42 U.S.C. 1885a or 1885b) in
2	mathematics, science, engineering, and
3	technology and how such activities will help
4	prepare such individuals to pursue postsec-
5	ondary studies in these fields; and
6	(v) a description of how changes in
7	student achievement will be assessed;
8	(D) a description of how the partnership
9	will assess its success; and
10	(E) a description of how programmatic as-
11	sessments will be made available to the larger
12	research community.
13	(2) Review of applications.—In evaluating
14	the applications submitted under paragraph (1), the
15	Director shall consider, at a minimum—
16	(A) the ability of the partnership to carry
17	out effectively the proposed programs;
18	(B) the degree to which activities carried
19	out by the partnership are based on relevant re-
20	search, including best practices, and are likely
21	to result in increased student achievement;
22	(C) the degree to which such activities are
23	aligned with State mathematics and science stu-

dent academic achievement standards;



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1	(D) the likelihood that the partnership will
2	demonstrate activities that can be widely imple-
3	mented as part of larger scale reform efforts;
4	and
5	(E) the extent to which the activities will
6	encourage the interest of individuals identified
7	in section 33 or 34 of the Science and Engi-
8	neering Equal Opportunities Act (42 U.S.C.
9	1885a or 1885b) in mathematics, science, engi-
10	neering, and technology and will help prepare
11	such individuals to pursue postsecondary stud-
12	ies in these fields.
13	(c) Report to Congress.—The Director shall
14	evaluate the program established under this section and
15	report the results to the Committee on Science of the
16	House of Representatives and the Committee on Com-
17	merce, Science, and Transportation of the Senate. At a
18	minimum, such evaluation shall—
19	(1) use a common set of benchmarks and as-
20	sessment tools to identify best practices and mate-
21	rials developed and demonstrated by the partner-
22	ships; and
23	(2) to the extent practicable, compare the effec-
24	tiveness of practices and materials developed and
25	demonstrated by the partnerships authorized under



- 1 this section with those of partnerships funded by
- 2 other State or Federal agencies.
- 3 (d) AUTHORIZATION OF APPROPRIATIONS.—There
- 4 are authorized to be appropriated to the Director to carry
- 5 out this section \$3,000,000, for the establishment of up
- 6 to 10 partnerships.

